

- Versailles area (France): recycling stable manure and wastewater treatment sludge on cultivated plots
- Réunion Island (France, Indian Ocean): organizing and assessing the recycling of various wastes at a territory level

The expected result to be delivered when the project is completed is a generic methodology that will make it possible for agronomists working with rural stakeholders to create highly efficient cropping and farming systems based on the use of a wide range of organic wastes.

The determinants of organic fertilizers used in urban and peri-urban agriculture: an econometric analysis

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Abstract

Urban poverty, increases in food demand, land pressures, pollution resulting from solid waste generation and from mineral fertilizers uses in urban and peri-urban agriculture, are becoming real issues in agriculture in Cameroon, and there is a growing need for organic fertilizers that result from solid waste recycling. Urban and peri-urban agriculture are potential regular users of large quantities of household wastes and compost; but these organic fertilizers are indeed scarcely used. This study proposes using a binomial Logit model on the one hand, to identify factors to encourage using compost in the urban and peri-urban lowlands in Cameroon, and on the other hand, to highlight the effects of these factors on different levels of fertilization using an ordered Logit model. Using a representative sample of 288 farmers, it was found that 41% of farmers use mixed compost and mineral fertilizer, 22% of them use mineral fertilizers exclusively, and 15% use compost exclusively. However, 23% of the farmers in Cameroon do not use any fertilizers. The binomial Logit model estimations show that variables like membership in farmers' cooperatives, land property rights, food cultivation, low levels of farm income and the distance between farmers' dwellings and their farms have an effect on whether compost is used in urban and peri-urban areas in Cameroon. In addition, the ordered Logit model estimation shows that the variables like land-property rights, food cultivation, the available chemical input budget and the distance between dwellings and farms explains fertilization at all levels. In light of these results, a participative solid waste management plan that encourages local composting in the lowlands would help to reduce pollution resulting from solid wastes while promoting the development of the urban and peri-urban urban agriculture.